



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/665,626	09/18/2003	Hochao Huang	250320-1030	6556
24504	7590	03/13/2006	EXAMINER	
THOMAS, KAYDEN, HORSTEMEYER & RISLEY, LLP 100 GALLERIA PARKWAY, NW STE 1750 ATLANTA, GA 30339-5948			MOON, SEOKYUN	
			ART UNIT	PAPER NUMBER
			2675	

DATE MAILED: 03/13/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/665,626

Applicant(s)

HUANG ET AL.

Examiner

Seokyun Moon

Art Unit

2675

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 18 September 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-9 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-9 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 18 September 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

21

## DETAILED ACTION

### ***Claim Rejections - 35 USC § 112***

1. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

2. **Claim 7** is rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

The limitation disclosed in claim 7, "*adjusting brightness information increases contrast information*" is not consistent with the aspect of the invention, "*brightness of video information is increased and contrast of video information is increased*" disclosed in specification [*Pg. 6 Lines 23-24 and Pg. 7 Lines 1-3*].

For further examination purpose, the claim limitation disclosed in claim 7 will be interpreted as "*adjusting contrast information increases contrast information*" which is consistent with the aspect of the invention disclosed in the specification.

***Claim Rejections - 35 USC § 102***

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4. **Claims 1-3** are rejected under 35 U.S.C. 102(e) as being anticipated by Cui et al. (U.S. Pub. No. 2004/0160435 A1, herein after referred to as “Cui”).

As to **claim 1**, Cui teaches a power-saving method (“*power management*”) for video-broadcasting system in liquid crystal display equipment, wherein said liquid crystal display equipment such as a notebook includes a computer and an LCD [Abstract] [Par. (0003) and (0004)], said power-saving method mainly comprising the steps of:

adjusting brightness of the backlight;

adjusting video information (“*image brightness*”) [Par. (0034) Lines 6-10];

Cui does not expressly disclose outputting commands about a back light source and video information.

However, it is required to include a device or a controller providing commands in Cui to control or to adjust the brightness of the backlight and video information.

Therefore, it is inherent for Cui to output commands about a back light source and video information.

As to **claim 2**, Cui teaches that adjusting brightness of the backlight decreases brightness of the backlight [*Par. (0034) Lines 6-10*].

As to **claim 3**, Cui teaches that decreasing brightness of the back light decreases brightness of the backlight by about 30% - 70% since the brightness of the backlight is proportional to the power consumption of the back light [*Par. (0034) Lines 6-10*].

### ***Claim Rejections - 35 USC § 103***

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. **Claims 4-9** are rejected under 35 U.S.C. 103(a) as being unpatentable over Cui in view of Lee (U.S. Pat. No. 6,963,329 B2, herein after referred to as "Lee").

As to **claims 4** and **5**, Cui teaches that command about video information comprises increasing brightness information in video information [*Par. (0034) Lines 6-10*].

Cui does not teach the command about video information to comprise adjusting contrast information in video information.

However, Lee teaches a controlling method for a portable computer system in which the brightness of a backlight is automatically controlled in accordance with a contrast sensed by a contrast sensing part [*Col. 2 Lines 52-56*].

It would have been obvious to one of ordinary skill in the art at the time of the invention to implement Lee's controlling method of adjusting the brightness of a backlight in accordance with the detected contrast to reduce a waste of electrical power in a portable computer system [*Col. 1 Lines 34-45*].

As to **claim 7**, Lee does not expressly disclose that adjusting contrast information increases contrast information.

However, it is required to increase the contrast of video information or image when the brightness of the backlight is reduced whereas to reduce the contrast of video information or image when the brightness of the backlight is increased, to compensate each effect on the displayed image caused by changing the brightness of the backlight and the contrast of video information or image.

Therefore, it is inherent for Lee to increase the contrast of video information since Lee discloses reducing the brightness of the backlight to reduce the power consumption.

As to **claims 6 and 8**, Cui modified by Lee does not expressly disclose increasing brightness information by about 50%-100% and increasing contrast information by about 70%-130%.

However, the disclosed specific ranges, 50%-100% for brightness and 70%-130% for contrast, for the increment of brightness and contrast for video information depend on the intensity of the backlight used for the display. In other words, even though the brightness of the backlight is reduced by about 30%-70%, the adjustment ranges for brightness and contrast are not limited to 50%-100% and 70%-130% for

Art Unit: 2675

optimal display if the designed intensity of the backlight varies. For example, when the designed intensity of the backlight is high, the adjustment ranges for brightness and contrast can be less than 50%-100% and 70%-130% for optimal display while the adjustment ranges for brightness and contrast can be greater than 50%-100% for and 70%-130% for optimal display when the designed intensity of the backlight is low.

Therefore, it is an obvious matter of design choice to specify the increment ranges for brightness and contrast for video information in such way depending on the designed intensity of the backlight source used, for optimal display.

As to **claim 9**, Cui teaches the used LCD to be TFT-LCD [*Col. 2 Lines 1-2*].

### ***Conclusion***

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Seokyun Moon whose telephone number is (571) 272-5552. The examiner can normally be reached on Mon - Fri (8:30 a.m. - 5:00 p.m.).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Amr Awad can be reached on (571) 272-7764. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2675

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Division 2629

Feb. 23, 2006

S.M.

AMR A. AWAD  
PRIMARY EXAMINER

A handwritten signature in black ink, appearing to read "Amr A. Awad", followed by a long, sweeping horizontal line that extends to the right.